1. **Course Title:**
   High Speed Multimedia Networks

2. **Course Code:**
   CS4285

3. **Course Aims & Objectives:**
   This course aims to provide an up-to-date knowledge of high-speed networks to students. The course covers basic concepts, architectures, protocols, advantages and limitations, and recent development of various high-speed networking technologies and how the various networks cope with multimedia data transmission and some multimedia applications. The current and future developments in high-speed networks are discussed. Multimedia applications such as Video on Demand, and multimedia stream are also discussed.

   After successful completion of the course, the students are able to:
   
   - understand the quality of services parameters for multimedia traffic and the various trade-off;
   - evaluate the network technologies for satisfying particular QOS requirements;
   - understand the design of high-speed LAN and wide area networks to support multimedia and real-time traffic and applications;
   - understand the mechanisms to control flow and congestion.

4. **Units:** 3

5. **Level:** B4

6. **Keyword Syllabus:**

7. **Teaching pattern:**
   *Duration of course:* 1 semester
   *Suggested lecture/tutorial/laboratory mix:* 2 hrs. lecture; 1 hr. tutorial.

8. **Assessment pattern:**
   *Examination duration:* 2 hours
   *Percentage of coursework, examination, etc.:* 30% CW; 70% Exam
   *Grading pattern:* Standard (A+AA-…F)
For a student to pass the course, at least 30% of the maximum mark for the examination must be obtained.

9. **Pre-requisites:** *(please quote course code & title)*
   CS3201 Computer Networks or
   EE3015 (old code EE3900) Computer Networks and EE2371 Data Communication Lab

10. **Pre-cursor:** *(please quote course code & title)*
    Nil

11. **Equivalent Courses:** *(please quote course code & title)*
    Nil

12. **Equivalent to the Old Course Code & Title**
    IT4702 High Speed Multimedia Networks

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**Returned by:**

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Department: Computer Science  
Extension: 8641  
Date: 10 May 2006